

# **Soweto Market Study**

*Prepared for*  
Zambia Trade and Investment Enhancement  
*and*  
Zambia Agribusiness Technical Assistance Centre

Wiggan Kanchela  
Marcelo LaFleur  
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## **Executive Summary**

Markets in Zambia provide opportunities for income generation to the ever-growing informal sector. With the privatisation programme (started in 1995) which led to companies being privatised start rationalising their operations to become efficient and investing in new technologies and machinery, a number of former state owned enterprises' employees were retrenched. With very few job opportunities most of the retrenched workers turned to trading in various goods in markets.

As far back as the second republic when there was only one political party (UNIP), almost all markets were highly politicised with traders at the market expected to be card-carrying members of the ruling party. With the re-introduction of multiparty democracy in 1991, an attempt has been made to reduce the level of influence exerted by the ruling party in market places, though they still maintain offices in markets. For Soweto Market, MMD has an office but their control has been restricted to traders with stands under pylons, an area that the Council has not authorised as a trading area due to the risk posed by the high-tension electric cables.

A notable feature of Zambian markets in general and Soweto Market in particular is that though the local authorities – Lusaka City Council collects levies, there is little or no services provided and this presents a major source of conflict between the council authorities and traders who do not see any justification in paying council levies.

In spite of its importance to all traders and residents of Lusaka, Soweto Market is an unpleasant environment especially in the rain season.

In addition to selling and buying of goods at Soweto Market, there are also all sorts of services provided in the market place, ranging from hair cutting, tailoring, shoe repair, milling of maize meal, bars, restaurants, selling of medicines by unauthorised dealers, transport services, and traditional healers.

## **Introduction**

This document is an attempt to both estimate the volume as well as describe the nature of trade in agricultural products at Soweto market.

This study tries to capture the nature of roles played by different participants in the marketing channels. They include farmers, wholesalers (merchants) and retailers. Estimates of the costs and profits to the farmers and wholesalers are also made.

## **Background**

Soweto market is the single largest market in Zambia with stores and stands numbering well over 7,200 with estimated daily revenue of US\$123,000. The products traded at the market range from agricultural products to groceries, hard ware, wood products, second hand clothes and many more. It has gained prominence as a distribution centre for most of the goods coming into Lusaka especially agricultural commodities from other provinces/towns and also from other countries like South Africa, Zimbabwe and Tanzania.

Soweto started as an illegal market mainly as a result of many traders wanting to conduct their business near the town centre. Recently, however, Lusaka City Council has been trying to formally legitimise its existence as a way to expand their revenue base through collection of levies. The City Council is also looking at ways of creating a conducive trading environment for the ever-growing informal sector.

The current governance structure of the market is fragmented, with the Lusaka City Council, many Trader Associations, and a wing of the ruling party, the Movement for Multiparty Democracy (MMD) each exerting various degrees of control and influence. The other formally structured section of the market is Lusaka City Market, under the control of the Ministry of Local Government and Housing.

ZAMTIE and ZATAC initiated the Soweto market study in order to have a good understanding of:

- The types of agricultural products traded at the market,
- The distribution and market channels for agricultural products of interest, and
- The market size and demand level for agricultural products of interest.

The Soweto market is also expected to serve as a basis in the future for a more comprehensive study of markets in order to identify and establish appropriate market structures in Zambia.

This project is a joint venture between ZAMTIE and ZATAC. The partners intend to investigate potential business opportunities in various agricultural products and enterprises. A market study has been initiated to identify and evaluate these opportunities.

## **Objective**

ZAMTIE's objective is to learn about the organisational structure and operation of the market in order to understand the importance of Soweto market in Zambian commercial activities.

ZATAC's objective is to identify agricultural products with volumes and revenue potential large enough that organised farmer groups can take advantage of these markets such as Soweto to sale their products profitably.

## **Key Findings**

### **1. Overall Market Structure**

**Appendix 1** shows a map of the various trading areas for most of the goods traded at Soweto Market. Lusaka City Market is under the Ministry of Local Government and Housing. The area stretching from the cabbage/onion trading areas to where sugar canes are sold is also not under the Lusaka City Council because that piece of land is under the Ministry of Lands and Natural Resources. However, the Lusaka City Council has applied to the Ministry of Lands and Natural Resources for title to that piece of land to be issued in their favour. The market is still expanding south in the open area beyond the area where sugar canes are sold.

### **2. Individual Crop Profiles**

#### **Cabbage**

##### Source

Trader goes to the farm and pays for a number of heads of cabbages he/she would like to order. The trader is allowed to cut the cabbages according to the sizes paid for small, medium or large. The price per head depends on the size of the cabbage. Some traders only buy large heads while others make combinations of the three sizes. After cutting farm workers assist in picking the cabbages and loading at no fee.

The major sources of cabbage are commercial farms in particular Evergreen farm (about 15 Kilometers from Soweto market along Lusaka – Mumbwa road), Equal vege farm in Chisamba and Dwambe farm in Kafue. Additionally small-scale farmers around Lusaka in particular Makeni, Chongwe, Shimabale, Chilanga, Mapepe and 10 miles (along Lusaka – Kabwe road) do supply cabbages to Soweto market traders. Occasionally small-scale farmers deliver cabbages at the market and either sale to the traders for cash or allow traders to sell on a commission.

##### Transport

Commercial farms mentioned above provide transport (10-ton truck) free of charge if the trader orders 2,000 heads of cabbage or more. To take advantage of this facilities traders ordering less than 2,000 heads of cabbage organize themselves to make one order of 2,000 heads or more.

Traders then use public transport to come back to Soweto and wait for the trucks to deliver the produce.

However, small scale farmers do not provide transport and therefore traders make their own transport arrangements by hiring one or two ton trucks carrying between 350 to 400 heads of cabbage.

##### Costs

Between March and September farm gate prices by commercial farms are K300, K450 and K600 for small, medium and large heads respectively. Small-scale farmers, however, tend to be expensive and the prices are usually in the ranges of K650, K700 and K800 for small, medium and large heads respectively. Because of this most traders only source their produce from small-scale farmers when cabbage is in short supply. Transport costs for a one or two-ton truck when cabbage is sourced from small-scale farms ranges from K35,000 to K40,000.

Between October and February cabbage is in short supply and farm get prices both from commercial and small-scale farmers are K800, K850 and K900 for small, medium and large heads respectively.

##### Levies

Each trader pays the following:

Lusaka City Council – none

K2,500 to the Kasoso Cabbage Committee (for cleaning the cabbage area and assistance towards funeral expenses) every day except Sunday.

K500 – K3,000 every night depending on quantity of cabbage left overnight paid directly to an individual engaged by the Cabbage committee to guard the produce in the cabbage area.

#### Selling prices

Soweto market prices are very volatile. Prices move up and down depending on the quantities on the market per given day, cost at source and season.

On average between March and September selling prices of cabbage sourced from commercial farms are K350, K500 and K800 for small, medium and large heads respectively. For cabbage sourced from small scale farmers prices are K700, K800 and K900 for small, medium and large heads respectively. During this time some traders indicated that they are at times forced to sell some of their produce at the same price paid when ordering from farms.

During the period October to February when cabbage is in short supply selling prices of cabbage sourced from both commercial and small scale farmers are K900, K1,000 and K1,100 for small, medium and large heads respectively.

#### Volume

Between March and September there are about 2 (10-ton) trucks (2,000 heads of cabbage) delivering cabbage on daily basis. Additionally an average of 3 (2-ton) trucks delivers cabbage on daily basis (carrying 350 to 400 heads of cabbage). Thus monthly deliveries during this period is 572 tons.

Between October and February one (10-ton) truck on average deliver cabbage every other day in addition to one (2-ton) truck a day. Thus monthly deliveries during this period being 264 tons.

This gives an annual estimate of cabbage deliveries of about 5,324 tons into Soweto market.

Monthly Totals	Volume (Tons)	Revenue		Gross Profit	
		Kwacha'000	US\$'000	Kwacha	US\$
March-September	572	K 61,105,000	\$ 17,459	K 11,110,000	\$ 3,174
October-February	264	K 37,400,000	\$ 10,686	K 5,610,000	\$ 1,603

### **Sugar Cane**

#### Source

Almost all sugar cane traded at Soweto market is grown in Kafue town.

Trader pays the farmer K50,000 which gives him the right to harvest about 25 units of sugar cane (each unit or bundle is made up of about 20-25 canes). The trader cuts the canes in the piece of land paid for assisted by farm workers.

#### Transport

Trader hires transport at K1,000 per unit of cane and pays deposit to the transporter at the farm gate. The trader then uses public transport to get to Soweto market and waits for his goods. A 15-tone truck carries about 300 units. Traders then use public transport to come back to Soweto and wait for the trucks to deliver the produce.

### Selling prices

Selling price for a unit of small cans is K4,000/unit while that of bigger cans is K5,000/unit.

### Levies

Traders do not pay any levies and provide their own security.

### Volume

Daily tonnage of canes delivered varies according to season as per estimates shown below:

Season	Daily Deliveries	Monthly Deliveries
April-June	75	1,650
July-August	60	1,320
September-February	Nil	Nil

This gives an annual estimate of sugar cane delivered of about 7,590 tons into Soweto market.

One trader can sell about 65 units in 2 to 3 days and there are approximately 10-20 traders each day.

<b>Sugar Cane</b>	Kwacha/Unit	Kwacha/Kg	US\$/ton
Farm Gate Price	2,000	40	11.43
Transport	1,000	20	5.71
Direct costs	3,000	60	17.14
Retail Price	4,500	90	25.71
<i>Profit</i>	<i>1,500</i>	<i>30</i>	<i>8.57</i>
<i>Profit Margin</i>	<i>50%</i>		

<b>Monthly Totals</b>	Volume (Tons)	Revenue		Gross Profit	
		Kwacha'000	US\$'000	Kwacha	US\$
April-June	1650	K 148,500	\$ 42	K 2,475,000	\$ 707
July-August	1320	K 118,800	\$ 34	K 1,980,000	\$ 566

## **Sweet potatoes**

### Source

Kapiri, Serenje and Solwezi.

For both Kapiri and Solwezi-sourced potatoes, traders travel to the farms or villages and purchase the produce.

Varieties: Sweet potatoes coming from Kapiri/Serenje are known as Kapiri with a shelf life of 7 days. The product from Solwezi is known as Solwezi and the shelf life is between 4- 5 days.

For both Kapiri and Solwezi – sourced sweet potatoes, traders travel to the farms or villages and purchase the produce packed in bags weighing about 35Kg each.

### Transport

Trader hires ox-cart to transport the produce from the villages to places near the main road Solwezi – Chingola road or Serenje/Kapiri – Lusaka road.

Trader hires a truck usually 30 – ton truck to deliver produce to Soweto market. Trader comes to the market with the same truck carrying the produce.

### Costs

Farm gate prices are K3,000 per bag for Serenje/Kapiri variety while for Solwezi it is K1,000 per bag.

Trader pays K200 per bag for the Ox-cart transport and K2,000 per bag from Serenje/Kapiri to the market. For Solwezi sourced produce the trader pays K2,500 to deliver the produce to the market. Additionally trader pays K200 being cost for each empty bag (cost of the empty bag is reclaimed from the buyer if the buyer does not have empty bags to replace).

### Levies

No levies are paid.

### Volume

Daily tonnage of sweet potatoes delivered varies according to season as per estimates shown below:

Season	Daily Deliveries	Monthly Deliveries
May-June	120	2,640
July-August	60	1,320
October-February	Nil	Nil

Traders interviewed reported selling between 60 and 100 bags per day and there are approximately 5-10 traders operating each day.

### Selling prices

The selling price for Serenje/Kapiri produce is K8,000 per bag while that of Solwezi is between K6,000 – K7,000 per bag.

Sweet Potatoes	Serenje/Kapiri		Solwezi	
	Kwacha/bag	US\$/ton	Kwacha/bag	US\$/ton
Farm Gate Price	3,000	24.49	1,000	8.16
Transport	2,200	17.96	2,700	22.04
Packing (bag)	200	1.63	200	1.63
Direct costs	5,400	44.08	3,900	31.84
Retail Price	8,000	65.31	6,500	53.06
Profit	2,600	21.22	5,500	44.90
Profit Margin	48%		141%	



Monthly Totals Serenje/Kapiri	Volume (Tons)	Revenue		Gross Profit	
		Kwacha	US\$	Kwacha	US\$
May-June	2640	K 172,408	\$ 49	K 6,864,000	\$ 1,961
July-August	1220	K 9,760,000	\$ 2,789	K 3,172,000	\$ 906

## Tomato

### Source

Mkushi, Chisamba, Mumbwa and Lusaka area.

Traders either:

- receives consignment of up to 400 boxes (each box weighing about 20Kg) and is paid on commission.
- purchases produce from the farms

### Transport

If produce is on consignment farmer delivers to the market and trader does not incur any transport costs.

If trader purchases produce at the farm, he hires truck (10-ton trucks) to deliver the produce at the market.

### Costs

There are wide seasonal variations in Farm gate prices for Tomato per box. Between May and November the price per box is between K3,500 to K4,000 while between December and April the price per box is about K25,000 per box. Transport cost is about K2,500 per box. Traders provide their own boxes in which tomatoes are packed.

### Levies

No levies paid

### Volume

Daily tonnage of canes delivered varies according to season as per estimates shown below:

Season	Daily Deliveries	Monthly Deliveries
May-November	50	1,100
December-April	20	440

Traders interviewed reported selling up to 400 boxes in two days. There are between 10-30 traders per day selling tomatoes in Soweto.

### Selling prices

Between May and November the selling price is K8,000 per box while between December and April it is between K35,000 to K40,000 per box.

<b>Tomatoes</b> <b>May-November</b>	Kwacha/Box	Kwacha/Kg	US\$/ton
Farm Gate Price	3,750	188	53.57
Transport	2,500	125	35.71
Direct costs	6,250	313	89.29
Retail Price	8,000	400	114.29
<b>Profit</b>	<b>1,750</b>	<b>88</b>	<b>25.00</b>
<i>Profit Margin</i>	28%		

<b>Tomatoes</b> <b>December-April</b>	Kwacha/Box	Kwacha/Kg	US\$/ton
Farm Gate Price	25,000	1,250	357.14
Transport	2,500	125	35.71
Direct costs	27,500	1,375	392.86
Retail Price	37,500	1,875	535.71
<b>Profit</b>	<b>10,000</b>	<b>500</b>	<b>142.86</b>
<i>Profit Margin</i>	36%		

<b>Monthly Totals</b>	Volume (Tons)	Revenue		Gross Profit	
		Kwacha	US\$	Kwacha	US\$
May-November	1100	K 8,800,000	\$ 2,514	K 1,925,000	\$ 550
December-April	440	K 16,500,000	\$ 4,714	K 4,400,000	\$ 1,257

## Bananas

### Source

Chirundu, Luangwa, Mkushi, Mazabuka, and Zimbabwe.

Trader travels to the farms and purchases raw produce. It takes 4-5 days for bananas to ripen.

### Transport

Traders hire transport before travelling to the farms. Usually small trucks of 1.2-2 tons are used.

### Costs

Farm gate prices are:

Mazabuka: K550-K600/Kg

Mkushi: K500/Kg

Chirundu and Luangwa K500/Kg

Zimbabwe K479/Kg

Bananas are harvested throughout the year and price changes are purely dependent on supply and demand.

Transport costs for bananas from Chirundu, Mazabuka, and Luangwa are between K300,000 and K350,000 per trip (1.2 ton truck.) Transport for bananas from Mkushi and Zimbabwe is approximately K500,000 per trip.

Chemicals used to facilitate ripening of bananas cost K1, 515/ton

### Levies

Traders pay the following levies:

- Committee levy K1,000 every Monday.
- Lusaka City Council market levy K13,500 per month.

### Volume

Daily tonnage of bananas delivered is shown below.

Season	Daily Deliveries	Monthly Deliveries
Year-round	17	850

Traders interviewed reported selling about 1-2 tons of bananas in 2-3 days and there are approximately 50 banana traders operating each day.

### Selling Prices

The selling prices for bananas from Mkushi, Luangwa, Chirundu, and Mazabuka are between K1,100 and K1,200 per Kg. Bananas from Zimbabwe sell for K900-K1,000 per Kg.

Kwacha/Kg	Farm Gate Price	Transport and Other Costs	Retail Price
Mazabuka	575	271	1,150
Chirundu	500	271	1,150
Luangwa	500	271	1,150
Mkushi	500	417	1,150
Zimbabwe	479	417	950

Monthly Totals	Volume (Tons)	Revenue		Gross Profit	
		Kwacha	US\$	Kwacha	US\$
Year-round	850	K 977,500,000	\$ 279,286	K 536,562,500	\$ 153,304

## **Watermelon**

### Source

Mkushi and Chibombo

For both Mkushi and Chibombo-sourced watermelons, traders travel to the farms and purchase the produce. The trader selects the melons in the field, which are cut and packed in 90 Kg bags. Each 90Kg bag contains about 15 watermelons. The watermelons are in three sizes Large, Medium and small.

### Transport

Trader hires ox-cart to transport the produce from the villages to places along the main Lusaka – Kapiri road. Trader then hires a truck depending on the quantity either a 20 or 30 – ton truck to deliver produce to Soweto market. Trader comes to the market with the same truck carrying the produce.

### Costs

Farm gate prices are K1,133, K810, K486 and K324 for Large, Medium, Small and very small respectively.

Trader pays K30,000 up to 50 (90Kg bags) for the Ox-cart transport and K5,000 to K6,000 per bag from Chibombo to the market.

### Levies

Trader pays the following levies per day:

- Security K2,500 per night
- Association fees K1,000 per day except Sunday.
- Lusaka City Council market levy K500 per day except Sunday.

### Volume

Due to the season in which the study was undertaken, only one trader was available for interviewing and therefore meaningful data to help in estimating volumes traded could not be obtained. There would be need to carry more research.

### Selling prices

Selling prices were K7,000, K5,000, K3,000, and K2,000 for large, medium, small and very small melons.

## **Pumpkins**

### Source

Kampiri Mposhi district

At the time during which the study was being undertaken there was only one trader at the market because the pumpkins were out of season. The trader was a farmer and the pumpkins he brought to the market were from his own farm. Therefore no meaningful data was obtained on pumpkins to help arrive at a conclusion. A market study needs to be undertaken when the pumpkins are in season.

## **Onion**

### Source

Major sources: Trucks from South Africa, Dyka Import and Export, Salim farm, York farm and EML Wateregreen.

Salim farm and EML water green deliver the onion to sale to traders on wholesale prices at the market.

For York farm traders go to the farm to buy the produce. Dyka Import and Export import Onion from South Africa to sell to traders on wholesale in addition to buying from local farmers which they later resale to traders on wholesale. A good number of South African traders are bringing onion from Johannesburg.

### Transport

Salim and EML Watergreen deliver to the market. South African onion traders have their own trucks, which they use to bring the crop to the market. As for Dyka Import and Export farmers order their produce and hire the boys with wheelbarrows paying K150 per each 10Kg of onion. For produce sourced from York farm farmers hire transport and pay K200 per each 10Kg bag.

### Costs

For the period April to July most of the onion traded at the market is from South Africa as there is very little from local farmers except those who dried. Order Prices range from K9,000 to K12,000 per 10Kg. For the period August to March South African onion stops coming in and most of the onion traded at the market is the locally grown. Order price per 10Kg bag is about K11,000 for the locally grown onion.

### Levies

Traders pay the following levies:

- Lusaka City Council levy K500 per day except Sunday.
- Potato and onion committee K1,000 every Monday (for cleaning the onion area and assistance towards funeral)
- Security K20 per 10Kg bag of onion and this is paid directly to an individual engaged by the people in the onion area to guard their produce overnight.

### Volume

Daily tonnage of 10Kg bags sold per day by major wholesalers varies according to season as per estimates shown below:

Season	Daily Deliveries	Monthly Deliveries
April-July	1,084	23,848
August-March	1,200	26,400

Estimated annual sales volume 306,592 tons.

Some traders interviewed reported selling up to 142 (10 Kg bags) per day, while wholesalers reported to sell up to 500 (10Kg) bags per day.

### Selling prices

Between April and July selling price ranges between K13,500 to K14,500 per 10Kg bag and for the period between August to March selling price ranges between K12,500 and K14,500 per 10Kg bag.

Onion	Fresh		Dried	
	Kwacha/bag	US\$/ton	Kwacha/bag	US\$/ton
Farm Gate Price	10,000	285.71	7,000	200.00
Transport	150	4.29	150	4.29
Security	20	0.57	20	0.57
Association Fee	5	0.14	5	0.14
Official Levy	13	0.37	13	0.37
Direct costs	10,188	291.09	7,188	205.37
Retail Price	14,000	400.00	8,000	228.57
Profit	3,812	108.91	1,000	28.57
Profit Margin	37%		14%	

Monthly	Volume (Tons)	Revenue		Profit	
		Kwacha	US\$	Kwacha	US\$
Fresh and Dried	238.5	K 2,623,500	\$ 750	K 573,831	\$ 164

## Irish Potatoes

### Source

Major sources: Tanzania, Zimbabwe, Dyka Import and Export (imported and local), Salim farm, farms around Lusaka (Makeni and Chilanga) and from Mazabuka.

For Irish potatoes bought from Dyka Import and Export and Tanzania trader buys within Soweto market and traders hire boys with wheelbarrows. For the produce from Tanzania it is packed in enlarged 90Kg bags and then traders repack in 10Kg bags. One 90Kg bag gives about 13 (10Kg) bags.

### Transport

For Tanzania supplied potatoes traders hire boys with wheelbarrows and pay K2,000 per 90Kg. For produce sourced from Dyka Import and Export trader pays K150 per 10Kg bag to transport the produce to the market. For produce from Mazabuka trader hires transport and pays K500 per 10Kg bag.

### Costs

For the Tanzania potatoes, order cost per 10Kg bag is K8, 214 while for the locally grown produce price varies according to the size of potatoes in the being thus being K7,500, K10,500, and K12,000 per 10Kg bag for small, medium, and large potatoes respectively.

### Levies

Traders pay the following levies:

- Lusaka City Council levy K500 per day except Sunday.
- Potato and onion committee K1,000 every Monday (for cleaning the onion area and assistance towards funeral.)
- Security K20 per 10Kg bag of Irish potatoes and this is paid directly to an individual engaged by the people in the onion/potato area to guard their produce overnight.

### Volume

Daily tonnage of 10Kg bags sold per day by major wholesalers varies according to season as per estimates shown below:

Season	Daily Deliveries	Monthly Deliveries
May-August	10.5	231

One trader interviewed reported selling up to 80 (10Kg) bags a day and supplying up to 100 bags to fast food outlets per week. There are usually 10-20 Irish potato traders per day.

### Selling prices

Between May and August, selling price ranges between K13,500 and K14,500 per 10 Kg bag. Prices in the December to February period are expected to be much higher due to pest problems inherent to rain-fed potatoes.

Monthly Totals	Volume (Tons)	Revenue		Profit	
		Kwacha	US\$	Kwacha	US\$
May-August	231	K 308,000,000	\$ 88,000	K 77,000,000	\$ 22,000

### **Data sources and methodology**

The following sources and techniques were used in computing this study's findings:

The wholesale trade profile was constructed through a series of field surveys at Soweto market. Each survey involved interviews of at least 3 traders for a short interview of roughly 20-30 minutes. The interviews were conducted over a period of five working days and were conducted in English or local language depending on the respondent's preference. The interview guide is outlined in **Appendix 2**.

The raw data from the survey was then aggregated, analysed and extrapolated to annual volumes traded at the market. It must be noted that much of the self-reported data may be couched in ways that are unfamiliar to survey respondents for example tonnage of trucks delivering the produce and weight of the produce whose current measure of measurement is the physical size for example, cabbage, Watermelons and pumpkins.

In instances where respondents' answers were "unknown," the missing data was inserted using sample averaging in order not to reject the respondent's other valid answers.

On site visit and interviews were conducted with Dyke Import and Export.

### **Conclusions and Recommendations**

Although some traders may attempt to form cartels in order to fix prices, their effective implementation is very doubtful because trading at Soweto market in almost all products is very competitive and prices for commodities in the market are to a large extent determined by the forces of demand and supply.

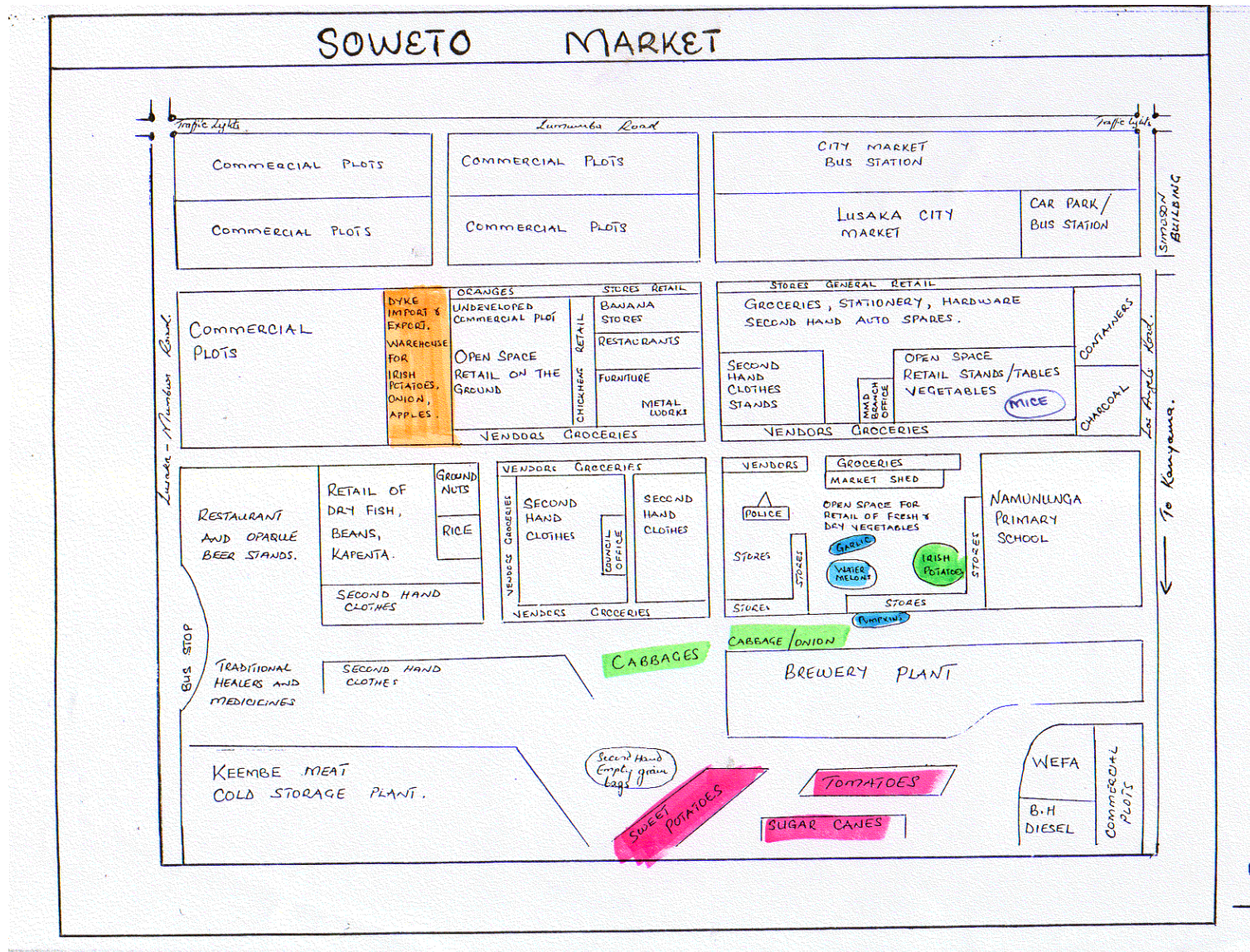
We recommend that further market research be undertaken to validate these findings, especially for products that were shown to have large volumes (Irish potatoes, sweet potatoes, tomato, and sugar cane).

Additionally, due to the problem of data accuracy, which is inherent to informal markets such as Soweto, new techniques should be employed to monitor variables such as the number and tonnage of trucks delivering to the market. We recommend that a longer-term study be commissioned with the goal of compiling not only more and better data, but also to further understand the dynamics of the Soweto marketplace.

### **Appendix**



# Appendix 1 – Soweto Market Map





## **Appendix 2 – Wholesale Survey Interview Guide**

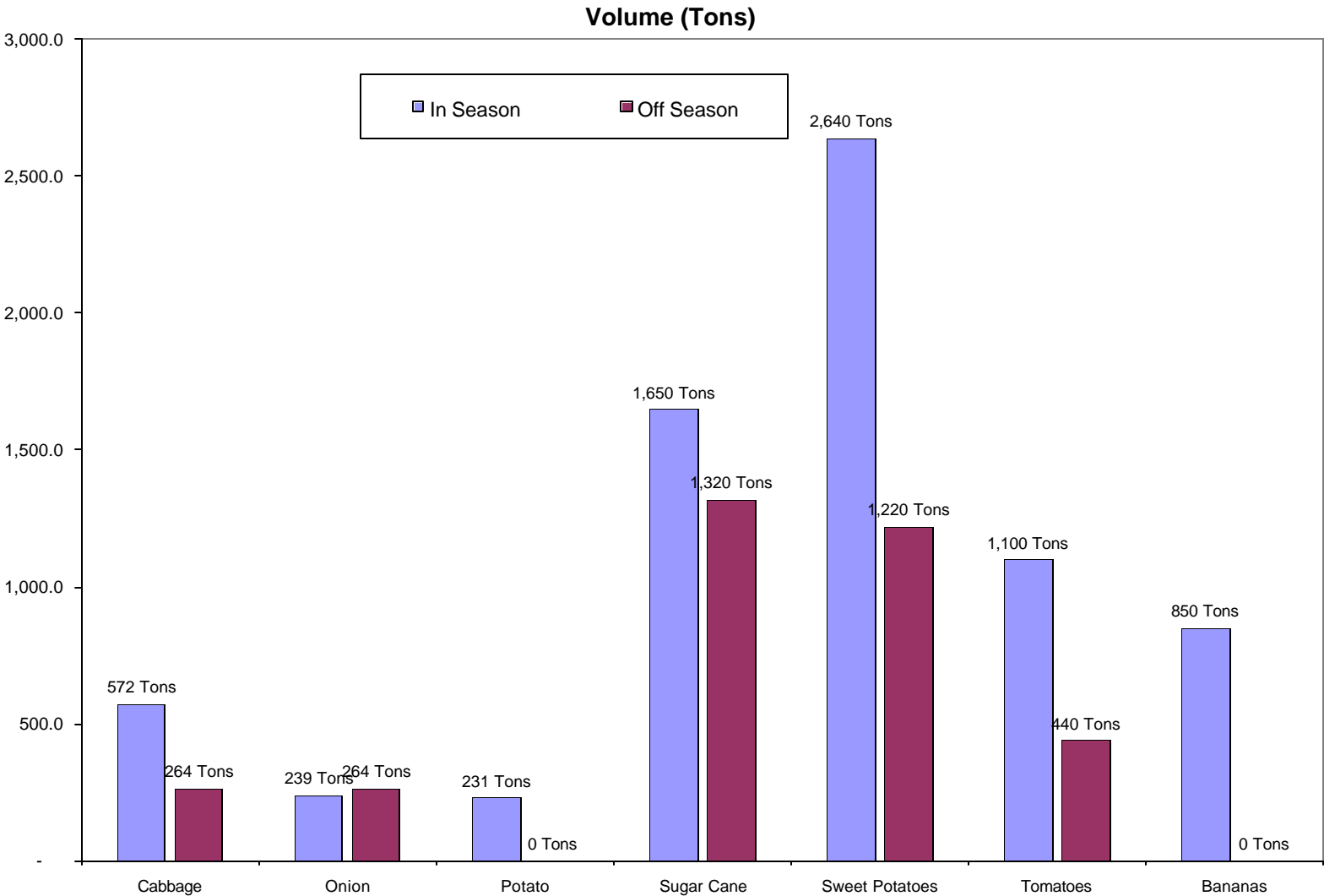
1. Seller's name.
2. Where do you source your produce?
3. Do you go out to source/buy produce at farm gate or produce delivered?
4. Do you pay cash for produce or is there any credit arrangement with source of your produce?
5. Is there any long-term customer/seller relationship with source of produce?
6. How much do you pay for farm produce per given unit?
7. Any other costs incurred such as transport security, council levies, etc.?
8. Quantities of produce obtained per given time.
9. How long does it take to sell given quantity of produce ordered?
10. Selling prices.
11. Variation in ordering costs/selling prices/quantities ordered from one period to another.
12. Frequency of order of the produce per week/month.

Appendix 3 – Data Tables for Each Crop

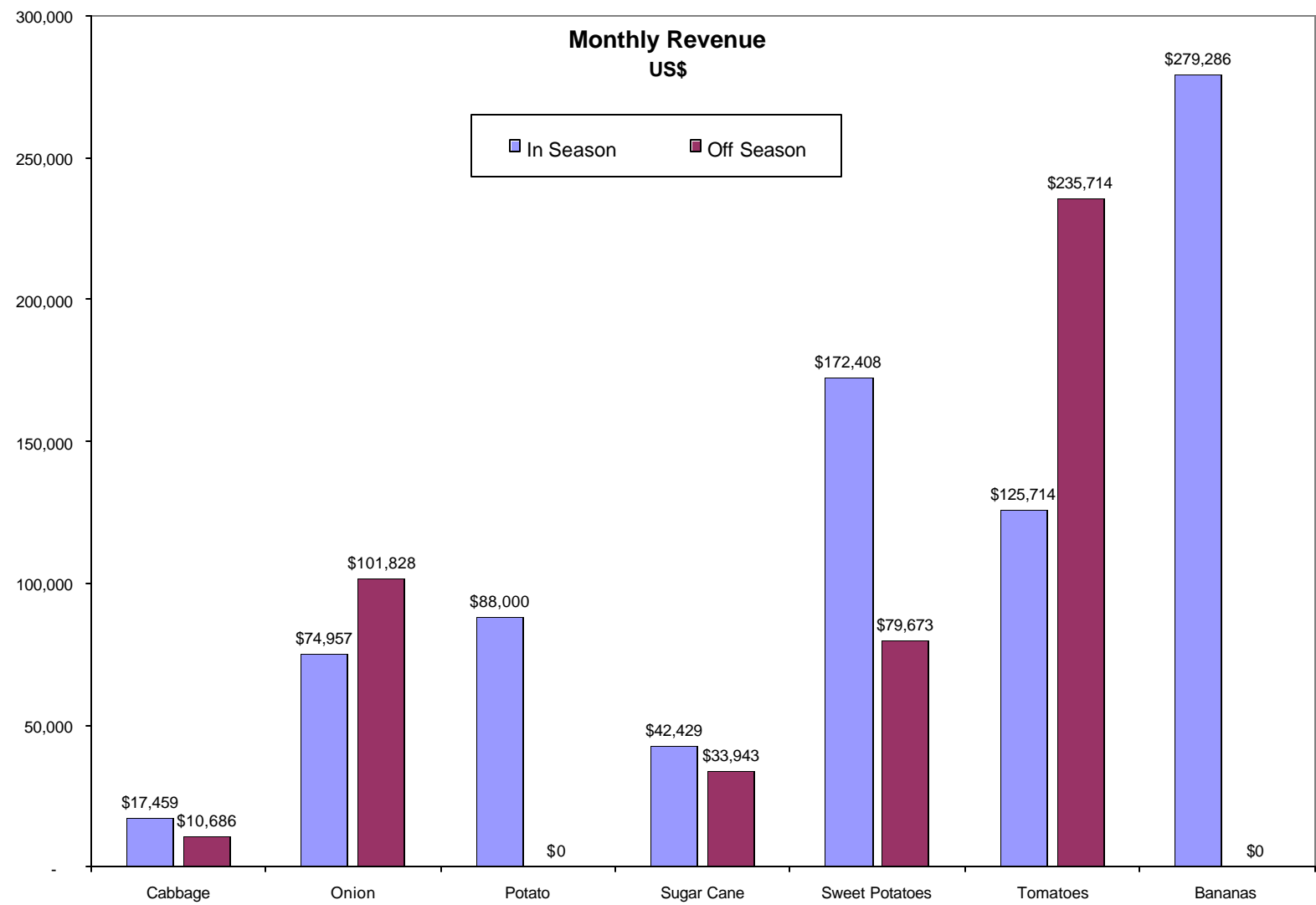
Crop In Season	Volume (Tons)	Revenue		Price US\$/ton
		Kwacha	US\$	
Cabbage	572.0	61,105,000	17,459	30.52
Onion	238.5	262,350,000	74,957	314.29
Potato	231.0	308,000,000	88,000	380.95
Sugar Cane	1,650.0	148,500,000	42,429	25.71
Sweet Potatoes	2,640.0	603,428,571	172,408	65.31
Tomatoes	1,100.0	440,000,000	125,714	114.29
Bananas	850.0	977,500,000	279,286	328.57

Crop Off Season	Volume (Tons)	Revenue		Price US\$/ton
		Kwacha	US\$	
Cabbage	264.0	37,400,000	10,686	40.48
Onion	264.0	356,400,000	101,828	385.71
Potato	n/a	n/a	n/a	n/a
Sugar Cane	1,320.0	118,800,000	33,943	25.71
Sweet Potatoes	1,220.0	278,857,143	79,673	65.31
Tomatoes	440.0	825,000,000	235,714	535.71
Bananas	n/a	n/a	n/a	n/a

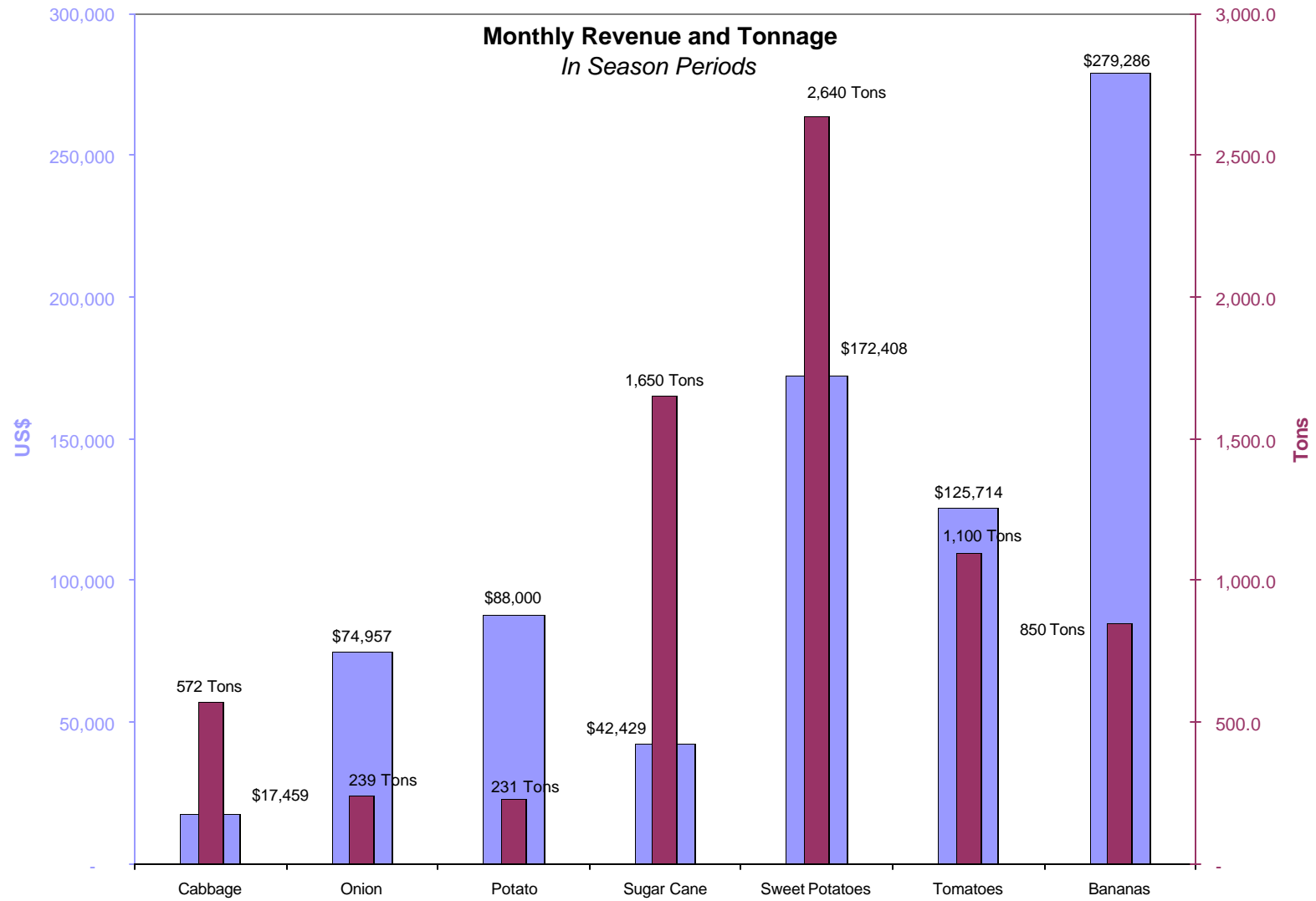
Appendix 4 – Monthly Volumes



Appendix 5 – Monthly Revenue in US\$



## Appendix 6 – Monthly Revenue and Tonnage



## Appendix 7 – Prices US\$/ton

